

RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) no errors detected.

Application Serial Number: 10/535,745

Source: PCT/10

Date Processed by STIC: 6/1/05

ENTERED

BEST AVAILABLE COPY





PCT

RAW SEQUENCE LISTING

DATE: 06/01/2005

PATENT APPLICATION: US/10/535,745

TIME: 16:23:12

Input Set : A:\24318-502-061 Sequence Listing.txt

Output Set: N:\CRF4\06012005\J535745.raw

```

3 <110> APPLICANT: Squillace, Rachel
4   Weiner, Weiner P.
6 <120> TITLE OF INVENTION: Immortalized Human Tuberous Sclerosis Null
7   Angiomyolipoma Cell and Method of Use Thereof
9 <130> FILE REFERENCE: 24318-502-061
C--> 11 <140> CURRENT APPLICATION NUMBER: US/10/535,745
C--> 12 <141> CURRENT FILING DATE: 2005-05-20
14 <150> PRIOR APPLICATION NUMBER: 60/556,344
15 <151> PRIOR FILING DATE: 2004-03-25
17 <160> NUMBER OF SEQ ID NOS: 62
19 <170> SOFTWARE: PatentIn Ver. 2.1
21 <210> SEQ ID NO: 1
22 <211> LENGTH: 752
23 <212> TYPE: DNA
24 <213> ORGANISM: Homo sapiens
26 <400> SEQUENCE: 1
27 ccgtcagaaa tctaaaccog tgactatcat gggactcaaa accagcccaa aaaataagtc 60
28 aaaacgatta agagccagag aagcagtcctt catacacgog gccagccagc agacagagga 120
29 ctctcattaa ggaaggtgtc ctgtgccctg accctacaag atgccaagag aagatgctca 180
30 cttcatctat ggttacccca agaaggggca cggccactct tacaccacgg ctgaagaggc 240
31 cgctgggacg ggcacccctga cagtgtacct gggagtctta ctgctcatcg gctgttggtg 300
32 ttgtagaaga cgaaatggat acagagcctt gatggataaa agtcttcatg ttggcactca 360
33 atgtgcctta acaagaagat gccacaaga agggtttgat catcgggaca gcaaagtgtc 420
34 tcttcaagag aaaaactgtg aacctgtggt tcccaatgct ccacctgctt atgagaaact 480
35 ctctgcagaa cagtcaccac caccttattc accttaagag ccagcgagac acctgagaca 540
36 tgctgaaatt atttctctca cacttttgct tgaatttaac acagacatct aatgttctcc 600
37 tttggaatgg ttaggaaaa atgcaagcca tctctaataa taagtcagtg ttaaaatttt 660
38 agtaggtccg ctagcagtag taatcatgtg aggaaatgat gagaaatatt aaattgggaa 720
39 aactccatca ataaatgttg caatgcatga ta 752
42 <210> SEQ ID NO: 2
43 <211> LENGTH: 1524
44 <212> TYPE: DNA
45 <213> ORGANISM: Homo sapiens
47 <400> SEQUENCE: 2
48 agcagacaga ggactctcat taaggaaggt gtccgtgtgcc ctgaccctac aagatgccaa 60
49 gagaagatgc tcacttcatc tatggttacc ccaagaaggg gcacggccac tcttacacca 120
50 cggctgaaga ggccgctggg atcggcatcc tgacagtgat cctgggagtc ttactgctca 180
51 tcggctgttg gtattgtaga agacgaaatg gatacagagc cttgatggat aaaagtcttc 240
52 atgttggcac tcaatgtgcc ttaacaagaa gatgccaca agaagggttt gatcatcggg 300
53 acagcaaagt gtctcttcaa gagaaaaact gtgaacctgt ggttcccaat gctccacctg 360
54 cttatgagaa actctctgca gaacagtcac caccacctta ttacacctaa gagccagcga 420
55 gacacctgag acatgctgaa attatttctc tcacactttt gcttgaattt aatacagaca 480
56 tctaattgtc tcctttggaa tgggtgtagga aaaatgcaag ccatctctaa taataagtca 540

```

RAW SEQUENCE LISTING

DATE: 06/01/2005

PATENT APPLICATION: US/10/535,745

TIME: 16:23:12

Input Set : A:\24318-502-061 Sequence Listing.txt

Output Set: N:\CRF4\06012005\J535745.raw

```

57 gtgttaaaat tttagtaggt ccgctagcag tactaatcat gtgaggaaat gatgagaaat 600
58 attaaattgg gaaaactcca tcaataaatg ttgcaatgca tgatactatc tgtgccagag 660
59 gtaatgttag taaatccatg gtgttatatt ctgagagaca gaattcaagt ggggtattctg 720
60 gggccatcca atttctcttt acttgaaatt tggctaataa caaactagtc aggttttcga 780
61 accttgaccg acatgaactg tacacagaat tgttccagta ctatggagtg ctcacaaagg 840
62 atacttttac aggttaagac aaagggttga ctggcctatt tatctgatca agaacatgtc 900
63 agcaatgtct ctttgtgctc taaaattcta ttatactaca ataatatatt gtaaagatcc 960
64 tatagctctt tttttttgag atggagtttc gcttttggtg cccaggctgg agtgcaatgg 1020
65 cgcgatcttg gctcaccata acctccgcct cccaggttca agcaattctc ctgccttagc 1080
66 ctccctgagta gctgggatta caggcgtgcg ccactatgcc tgactaatth tgtagtttta 1140
67 gtagagacgg ggtttctcca tgttggtcag gctggtctca aactcctgac ctgagggtgag 1200
68 ctgcccgcct cagcctccca aagtgtctgga attacaggcg tgagccacca cgcctggctg 1260
69 gatcctatat cttaggtaag acatataacg cagtctaatt acatttcact tcaagggtca 1320
70 atgctattct aactaatgac aagtattttc tactaaacca gaaattggta gaaggattta 1380
71 aataagtaaa agctactatg tactgcctta gtgctgatgc ctgtgtactg ccttaaatgt 1440
72 acctatggca atttagctct cttgggttcc caaatccctc tcacaagaat gtgcagaaga 1500
73 aatcataaag gatcagagat tctg 1524

```

76 <210> SEQ ID NO: 3

77 <211> LENGTH: 118

78 <212> TYPE: PRT

79 <213> ORGANISM: Homo sapiens

81 <400> SEQUENCE: 3

```

82 Met Pro Arg Glu Asp Ala His Phe Ile Tyr Gly Tyr Pro Lys Lys Gly
83 1 5 10 15
85 His Gly His Ser Tyr Thr Thr Ala Glu Ala Ala Gly Ile Gly Ile
86 20 25 30
88 Leu Thr Val Ile Leu Gly Val Leu Leu Ile Gly Cys Trp Tyr Cys
89 35 40 45
91 Arg Arg Arg Asn Gly Tyr Arg Ala Leu Met Asp Lys Ser Leu His Val
92 50 55 60
94 Gly Thr Gln Cys Ala Leu Thr Arg Arg Cys Pro Gln Glu Gly Phe Asp
95 65 70 75 80
97 His Arg Asp Ser Lys Val Ser Leu Gln Glu Lys Asn Cys Glu Pro Val
98 85 90 95
100 Val Pro Asn Ala Pro Pro Ala Tyr Glu Lys Leu Ser Ala Glu Gln Ser
101 100 105 110
103 Pro Pro Pro Tyr Ser Pro
104 115

```

107 <210> SEQ ID NO: 4

108 <211> LENGTH: 1607

109 <212> TYPE: DNA

110 <213> ORGANISM: Homo sapiens

112 <400> SEQUENCE: 4

```

113 atgaccagg caggccggcg gggctctggc acaccgagc cgcgtccgcg aacacagccc 60
114 atggcctccc cgcgcctagg gacctctgac tgcccacgc gggacgcagc cagcagctc 120
115 gtgctgagct tccagcgcg ggccttccac gcgctctgcc tgggcagcgg cgggctccgc 180
116 ttggcgctgg gccttctgca gctgctgccc ggccgcgggc ccgcggggccc cgggtccccc 240
117 gcgacgtccc cgcgcgcctc ggtccgcata ctgcgcgctg ccgctgctg cgacctctc 300
118 ggctgcctgg gtatggtgat ccggtccacc gtgtgggttag gattcccaaa ttttgttgac 360

```

RAW SEQUENCE LISTING

DATE: 06/01/2005

PATENT APPLICATION: US/10/535,745

TIME: 16:23:12

Input Set : A:\24318-502-061 Sequence Listing.txt

Output Set: N:\CRF4\06012005\J535745.raw

```

119 agcgtctcgg atatgaacca cacggaaatt tggcctgctg ctttctgcgt ggggagtgcg 420
120 atgtggatcc agctgttgta cagtgcctgc ttctgggtggc tgttttgcta tgcagtggat 480
121 gcttatctgg tgatccggag atcggcagga ctgagcacca tcctgctgta tcacatcatg 540
122 gcgtggggcc tggccaccct gctctgtgtg gagggagccg ccatgctcta ctacccttcc 600
123 gtgtccaggt gtgagcgggg cctggaccac gccatccccc actatgtcac catgtacctg 660
124 cccctgctgc tggttctcgt ggcgaacccc atcctgttcc aaaagacagt gactgcagtg 720
125 gcctctttac ttaaaggaag acaaggcatt tacacggaga acgagaggag gatgggagcc 780
126 gtgatcaaga tccgattttt caaaatcatg ctggttttaa ttatttggtg gttgtcgaat 840
127 atcatcaatg aaagcctttt attctatctt gagatgcaaa cagatatcaa tggaggttct 900
128 ttgaaacctg tcagaactgc agccaagacc acatggttta ttatgggaat cctgaatcca 960
129 gcccagggat ttctcttgtc ttggccttc tacggctgga caggatgcag cctgggtttt 1020
130 cagtctccca ggaaggagat ccagtgggaa tcactgacca cctcggctgc tgagggggct 1080
131 caccatccc cactgatgcc ccatgaaaac cctgcttccg ggaagggtgc tcaagtggtg 1140
132 gggcagactt ctgacgaagc cctgagcatg ctgtctgaag gttctgatgc cagcacaatt 1200
133 gaaattcaca ctgcaagtga atcctgcaac aaaaatgagg gtgaccctgc tctcccaacc 1260
134 catggagacc tatgaagggg atgtgctggg ggtccagacc ccatattcct cagactcaac 1320
135 aattcttggt ctttagaact gtgttctcac cttcccaaca ctgcactgcc gaagtgtagc 1380
136 ggccccaaa ccttgctctc atcaccagct agagcttctt cccgaagggc ctttaggata 1440
137 ggagaaaggg tcatgcaca cacgtgtgag aatggaagag cccctccag accactctac 1500
138 agctgctcta gccttagttg ccactaggaa gttttctgag gctggctgta aagtaagtgt 1560
139 aagggtccca tccttgggga agtagttaa taaaatagtt atgactg 1607

```

142 <210> SEQ ID NO: 5

143 <211> LENGTH: 424

144 <212> TYPE: PRT

145 <213> ORGANISM: Homo sapiens

147 <400> SEQUENCE: 5

```

148 Met Thr Gln Ala Gly Arg Arg Gly Pro Gly Thr Pro Glu Pro Arg Pro
149   1           5           10           15
151 Arg Thr Gln Pro Met Ala Ser Pro Arg Leu Gly Thr Phe Cys Cys Pro
152           20           25           30
154 Thr Arg Asp Ala Ala Thr Gln Leu Val Leu Ser Phe Gln Pro Arg Ala
155           35           40           45
157 Phe His Ala Leu Cys Leu Gly Ser Gly Gly Leu Arg Leu Ala Leu Gly
158           50           55           60
160 Leu Leu Gln Leu Leu Pro Gly Arg Arg Pro Ala Gly Pro Gly Ser Pro
161           65           70           75           80
163 Ala Thr Ser Pro Pro Ala Ser Val Arg Ile Leu Arg Ala Ala Ala Ala
164           85           90           95
166 Cys Asp Leu Leu Gly Cys Leu Gly Met Val Ile Arg Ser Thr Val Trp
167           100          105          110
169 Leu Gly Phe Pro Asn Phe Val Asp Ser Val Ser Asp Met Asn His Thr
170           115          120          125
172 Glu Ile Trp Pro Ala Ala Phe Cys Val Gly Ser Ala Met Trp Ile Gln
173           130          135          140
175 Leu Leu Tyr Ser Ala Cys Phe Trp Trp Leu Phe Cys Tyr Ala Val Asp
176           145          150          155          160
178 Ala Tyr Leu Val Ile Arg Arg Ser Ala Gly Leu Ser Thr Ile Leu Leu
179           165          170          175
181 Tyr His Ile Met Ala Trp Gly Leu Ala Thr Leu Leu Cys Val Glu Gly

```

RAW SEQUENCE LISTING

DATE: 06/01/2005

PATENT APPLICATION: US/10/535,745

TIME: 16:23:12

Input Set : A:\24318-502-061 Sequence Listing.txt

Output Set: N:\CRF4\06012005\J535745.raw

```

182          180          185          190
184 Ala Ala Met Leu Tyr Tyr Pro Ser Val Ser Arg Cys Glu Arg Gly Leu
185          195          200          205
187 Asp His Ala Ile Pro His Tyr Val Thr Met Tyr Leu Pro Leu Leu Leu
188          210          215          220
190 Val Leu Val Ala Asn Pro Ile Leu Phe Gln Lys Thr Val Thr Ala Val
191 225          230          235          240
193 Ala Ser Leu Leu Lys Gly Arg Gln Gly Ile Tyr Thr Glu Asn Glu Arg
194          245          250          255
196 Arg Met Gly Ala Val Ile Lys Ile Arg Phe Phe Lys Ile Met Leu Val
197          260          265          270
199 Leu Ile Ile Cys Trp Leu Ser Asn Ile Ile Asn Glu Ser Leu Leu Phe
200          275          280          285
202 Tyr Leu Glu Met Gln Thr Asp Ile Asn Gly Gly Ser Leu Lys Pro Val
203          290          295          300
205 Arg Thr Ala Ala Lys Thr Thr Trp Phe Ile Met Gly Ile Leu Asn Pro
206 305          310          315          320
208 Ala Gln Gly Phe Leu Leu Ser Leu Ala Phe Tyr Gly Trp Thr Gly Cys
209          325          330          335
211 Ser Leu Gly Phe Gln Ser Pro Arg Lys Glu Ile Gln Trp Glu Ser Leu
212          340          345          350
214 Thr Thr Ser Ala Ala Glu Gly Ala His Pro Ser Pro Leu Met Pro His
215          355          360          365
217 Glu Asn Pro Ala Ser Gly Lys Val Ser Gln Val Gly Gly Gln Thr Ser
218          370          375          380
220 Asp Glu Ala Leu Ser Met Leu Ser Glu Gly Ser Asp Ala Ser Thr Ile
221 385          390          395          400
223 Glu Ile His Thr Ala Ser Glu Ser Cys Asn Lys Asn Glu Gly Asp Pro
224          405          410          415
226 Ala Leu Pro Thr His Gly Asp Leu
227          420
230 <210> SEQ ID NO: 6
231 <211> LENGTH: 2026
232 <212> TYPE: DNA
233 <213> ORGANISM: Homo sapiens
235 <400> SEQUENCE: 6
236 ctcgagatgg atctggtgct aaaaagatgc cttcttcatt tggctgtgat aggtgctttg 60
237 ctggctgtgg gggctacaaa agtaccaga aaccaggact ggcttggtgt ctcaaggcaa 120
238 ctcagaacca aagcctggaa caggcagctg tatccagagt ggacagaagc ccagagactt 180
239 gactgctgga gaggtggtca agtgccctc aaggctcagta atgatgggcc tacactgatt 240
240 ggtgcaaatg cctccttctc tattgccttg aacttccctg gaagccaaaa ggtattgcca 300
241 gatgggcagg ttatctgggt caacaatacc atcatcaatg ggagccagggt gtggggagga 360
242 cagccagtgt atccccagga aactgacgat gcctgcattt tccctgatgg tggaccttgc 420
243 ccattctggct cttggtctca gaagagaagc tttgtttatg tctggaagac ctggggccaa 480
244 tactggcaag ttctaggggg ccagtggtct gggctgagca ttgggacagg cagggcaatg 540
245 ctgggacacac acaccatgga agtgactgtc taccatcgcc ggggatcccg gagctatgtg 600
246 cctcttgctc attccagctc agccttcacc attactgacc aggtgccttt ctccgtgagc 660
247 gtgtcccagt tgcgggcctt ggatggaggg aacaagcact tcctgagaaa tcagcctctg 720
248 acctttgccc tccagctcca tgacccaggt ggctatctgg ctgaagctga cctctcctac 780

```

RAW SEQUENCE LISTING

DATE: 06/01/2005

PATENT APPLICATION: US/10/535,745

TIME: 16:23:12

Input Set : A:\24318-502-061 Sequence Listing.txt

Output Set: N:\CRF4\06012005\J535745.raw

```

249 acctgggact ttggagacag tagtggaacc ctgatctctc gggcacttgt ggtcactcat 840
250 acttacctgg agcctggccc agtcactgcc cagggtggtcc tgcaggctgc cattcctctc 900
251 acctcctgtg gctcctcccc agttccaggc accacagatg ggcacaggcc aactgcagag 960
252 gcccctaaca ccacagctgg ccaagtgcct actacagaag ttgtgggtac tacacctggt 1020
253 caggcgccaa ctgcagagcc ctctggaacc acatctgtgc aggtgccaac cactgaagtc 1080
254 ataagcactg cacctgtgca gatgccaaact gcagagagca caggatatgac acctgagaag 1140
255 gtgccagttt cagaggctcat gggataccaca ctggcagaga tgtcaactcc agaggctaca 1200
256 ggtatgacac ctgcagaggt atcaattgtg gtgctttctg gaaccacagc tgcacaggta 1260
257 acaactacag agtgggtgga gaccacagct agagagctac ctatccctga gcctgaaggt 1320
258 ccagatgcca gctcaatcat gtctacggaa agtattacag gttccctggg cccctgctg 1380
259 gatggtacag ccaccttaag gctggtgaag agacaagtcc cctggattg tgttctgtat 1440
260 cgatatgggt ccttttccgt caccctggac attgtccagg gtattgaaag tgccgagatc 1500
261 ctgcaggctg tgccgtccgg tgagggggat gcatttgagc tgactgtgtc ctgccaaagg 1560
262 gggctgcccc aggaagcctg catggagatc tcatcgccag ggtgccagcc ccctgcccag 1620
263 cggtgtgcc agcctgtgct acccagccca gcctgccagc tggttctgca ccagatactg 1680
264 aagggtggct cggggacata ctgcctcaat gtgtctctgg ctgataccaa cagcctggca 1740
265 gtggtcagca cccagcttat catgcctggt caagaagcag ggggccttgg gcaggttccg 1800
266 ctgatcgtgg gcatcttgct ggtgttgatg gctgtggtcc ttgcatctct gatatatagg 1860
267 cgcagactta tgaagcaaga cttctccgta cccagttgc cacatagcag cagtcactgg 1920
268 ctgcgtctac cccgcatctt ctgctcttgt cccattggtg agaatagccc cctcctcagt 1980
269 gggcagcagg tctgagtact ctcatatgat gctgtgattg cggccg 2026
272 <210> SEQ ID NO: 7
273 <211> LENGTH: 1986
274 <212> TYPE: DNA
275 <213> ORGANISM: Homo sapiens
277 <400> SEQUENCE: 7
278 atggatctgg tgctaaaaaag atgccttctt catttggtctg tgataggtgc tttgctggct 60
279 gtgggggcta caaaagtacc cagaaaccag gactggcttg gtgtctcaag gcaactcaga 120
280 accaaagcct ggaacaggca gctgtatcca gagtggacag aagcccagag acttgactgc 180
281 tggagaggtg gtcaagtgtc cctcaaggtc agtaatgatg ggcctacact gattggtgca 240
282 aatgcctcct tctctattgc cttgaacttc cctggaagcc aaaaggattt gccagatggg 300
283 caggttatct gggtaacaa taccatcatc aatggtagcc aggtgtgggg aggacagcca 360
284 gtgtatcccc aggaaactga cgatgcctgc atcttccctg atggtggacc ttgccatct 420
285 ggctcttggg ctcaagaagag aagctttgtt tatgtctgga agacctgggg tcaatactgg 480
286 caagttctag ggggcccagt gtctgggctg agcattggga caggcagggc aatgctgggc 540
287 acacacacca tgaagtgtac tgtctaccat cgccggggat cccggagcta tgtgcctctt 600
288 gctcattcca gctcagcctt caccattact gaccaggtgc ctttctccgt gagcgtgtcc 660
289 cagttgcggg ccttggatgg agggaacaag cacttcctga gaaatcagcc tctgaccttt 720
290 gccctccagc tccatgaccc cagtggctat ctggctgaag ctgacctctc ctacacctgg 780
291 gactttggag acagtagtgg aaccctgatc tctcgggcac ttgtggtcac tcatacttac 840
292 ctggagcctg gcccagtcac tgcccagggt gtccctgcagg ctgccattcc tctcacctcc 900
293 tgtggctcct ccccagttcc aggcaccaca gatgggcaca ggccaactgc agaggcccct 960
294 aacaccacag ctggccaagt gcctactaca gaagtgtggt gtactacacc tggtcaggcg 1020
295 ccaactcag agccctctgg aaccactct gtgcagggtc caaccactga agtcataagc 1080
296 actgcacctg tgcagatgcc aactgcagag agcacaggta tgacacctga gaaggtgcca 1140
297 gtttcagagg tcatgggtac cacactggca gagatgtcaa ctccagaggc tacaggatatg 1200
298 acacctgcag aggtatcaat tgtggtgctt tctggaacca cagctgcaca ggtaacaact 1260
299 acagagtggg tggagaccac agctagagag ctacctatcc ctgagcctga aggtccagat 1320
300 gccagctcaa tcatgtctac ggaaagtatt acaggttccc tgggccccct gctggatggt 1380

```

VERIFICATION SUMMARY

DATE: 06/01/2005

PATENT APPLICATION: US/10/535,745

TIME: 16:23:13

Input Set : A:\24318-502-061 Sequence Listing.txt

Output Set: N:\CRF4\06012005\J535745.raw

L:11 M:270 C: Current Application Number differs, Replaced Current Application Number

L:12 M:271 C: Current Filing Date differs, Replaced Current Filing Date